

# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FI	LING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	ATTORNEY DOCKET NO. CONFIRMATION NO.	
10/675,288	C	9/30/2003	William Joseph Jacob	. 5436		
	7590	07/26/2006		EXAMINER		
William Jose			LOPEZ, AMADEUS SEBASTIAN			
10904 Indiana Avenue Kansas City, MO 64137				ART UNIT	PAPER NUMBER	
,				3743		
			DATE MAILED: 07/26/2006			

Please find below and/or attached an Office communication concerning this application or proceeding.

				<i>(</i>				
	Application	No.	Applicant(s)					
	10/675,288		JACOB, WILLIAM	JOSEPH				
Office Action Summary	Examiner		Art Unit					
	Amadeus S.		3743					
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply								
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).  Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).								
Status								
1) Responsive to communication(s) filed or	n <u>30 September 20</u>	<u>03</u> .						
,_	This action is <b>FINAL</b> . 2b)⊠ This action is non-final.							
•	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is							
closed in accordance with the practice u	nder Ex parte Qua	yle, 1935 C.D. 11, 45	53 O.G. 213.					
Disposition of Claims								
4) Claim(s) 1-20 is/are pending in the application	cation.	•						
4a) Of the above claim(s) <u>15-20</u> is/are withdrawn from consideration.								
5) Claim(s) is/are allowed.								
6)⊠ Claim(s) <u>1-11,13 and 14</u> is/are rejected.								
7) Claim(s) 12 is/are objected to.								
8) Claim(s) <u>1-20</u> are subject to restriction and/or election requirement.								
Application Papers								
9)⊠ The specification is objected to by the Ex	caminer.							
10)⊠ The drawing(s) filed on <u>30 September 2003</u> is/are: a) accepted or b)⊠ objected to by the Examiner.								
Applicant may not request that any objection								
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).								
11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.								
Priority under 35 U.S.C. § 119								
12) Acknowledgment is made of a claim for f	foreign priority unde	er 35 U.S.C. § 119(a	)-(d) or (f).					
a) All b) Some * c) None of:								
1. Certified copies of the priority documents have been received.								
2. Certified copies of the priority documents have been received in Application No								
3. Copies of the certified copies of the priority documents have been received in this National Stage								
application from the International Bureau (PCT Rule 17.2(a)).  * See the attached detailed Office action for a list of the certified copies not received.								
Gee the attached detailed office action to								
Attack mount(s)								
Attachment(s)  1) Notice of References Cited (PTO-892)		4) Interview Summary	(PTO-413)					
2) Notice of Draftsperson's Patent Drawing Review (PTO-		Paper No(s)/Mail D  Notice of Informal F	ate	D-152)				
Information Disclosure Statement(s) (PTO-1449 or PTO Paper No(s)/Mail Date		6) Other:	atom Application (FT)					

#### **DETAILED ACTION**

#### Election/Restrictions

Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. Claims 1-14, drawn to goggles, classified in class 2, subclass 428.
- II. Claims 15-20, drawn to a remote breathing assembly for protecting a wearer's face and its method of use, classified in class 128, subclass 201.27.
- 1. The inventions are distinct, each from the other because of the following reasons:

Inventions I and II are related as combination and subcombination. Inventions in this relationship are distinct if it can be shown that (1) the combination as claimed does not require the particulars of the subcombination as claimed for patentability, and (2) that the subcombination has utility by itself or in other combinations (MPEP § 806.05(c)). In the instant case, the combination as claimed does not require the particulars of the subcombination as claimed because the remote breathing assembly or the method of protecting a portion of a person's face can be carried out by goggles that are known in the art with a port for a breathing tube. The subcombination has separate utility such as the periphery view lenses that are defined by a front, left, and right sections where the left and right sections presents a length not less than one-eight of the lateral front length. Also the goggles used within the remote breathing assembly and method for protecting the user's face does not have to have compressible liner, a liner interface, etc.

**Art Unit: 3743** 

Because these inventions are independent or distinct for the reasons given above and have acquired a separate status in the art in view of their different classification, restriction for examination purposes as indicated is proper.

2. Examiner contacted the applicant via the telephone on 7/20/06 regarding the restriction requirement. Applicant chose to elect invention I drawn to goggles and claims 1-14 with traverse.

#### Information Disclosure Statement

3. The examiner has considered all references disclosed in the information disclosure statement filed on 9/30/2003.

### **Drawings**

4. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(4) because reference character "62" has been used to designate both "fog or tinted material" (Page 7, line 24) and "interstitial material" (Page 8). Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner,

Art Unit: 3743

the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Page 4

5. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because they do not include the following reference sign(s) mentioned in the description: 70; adjustable self-fastening mechanism. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

#### Specification

6. The use of the trademark VELCRO on page 10, line 21 has been noted in this application. It should be capitalized wherever it appears and be accompanied by the generic terminology.

Although the use of trademarks is permissible in patent applications, the proprietary nature of the marks should be respected and every effort made to prevent their use in any manner which might adversely affect their validity as trademarks.

7. The disclosure is objected to because of the following informalities:

Art Unit: 3743

a. On page 1 in line 31 and on page 2 in line 1, the word "devises" should be deleted and replaced with -- devices --.

**b.** On page 2 in line 1, the word "breath" should be deleted and replaced with -- breathe --.

## Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

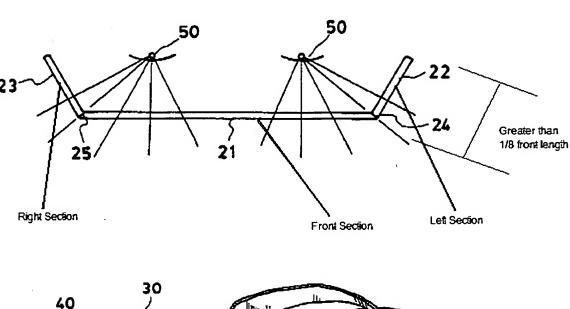
The factual inquiries set forth in *Graham* v. *John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

- 1. Determining the scope and contents of the prior art.
- 2. Ascertaining the differences between the prior art and the claims at issue.
- 3. Resolving the level of ordinary skill in the pertinent art.
- Considering objective evidence present in the application indicating obviousness or nonobviousness.
- 2. Claims 1-7 and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent No. 6341863 to Chen-Lieh in view of US Patent No. 3825953 to Hunter in further view of US Patent No. 6668823 to Liu.
- 3. With regards to claim 1, what is taught and shown by Chen-Lieh in Figs 1-5 and the figures below is a periphery viewable goggle for protecting a portion of a wearer's

face from externalities, said goggle comprising: a lens (20) having transparent front, left and right sections (labeled in figure below), wherein said front section defines a lateral front length, and said left and right sections each extends transversely from the front section and presents a length not less than one-eighth of the lateral front length; a liner (30) attached to the lens, and configured to form a seal between the lens and the wearer's face, when the goggle is donned (although not explicitly stated by Chen-Lieh, it is inherent that skirt 30 forms a seal between the lens and the wearer's face because that is how goggles function; a seal is formed around the periphery of the mask so that water may not enter the goggles); and a securing element (straps labeled in Fig. 2 below) for securing the lens in a fixed position relative to the wearer's face, and compressing the liner, so as to form an airtight chamber between the lens and the portion of the wearer's face, when the goggle is donned. What is not taught by Chen-Lieh, but is taught by Hunter is that the lens is flexible (Col. 3, lines 33-35). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the lens of Chen-Lieh to be flexible because it is well known in the art as taught by Hunter to make the lenses flexible to perhaps be able to make the lenses removable for cleaning or replacement. Further, Chen-Lieh does not explicitly state that the liner (30) is compressible. What is taught by Liu are goggles in which the liner (102) is compressible (Col. 1, line 66 to Col. 2, line 7; states that peripheral edge 102 is resilient which means it is capable of being compressed). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the goggles of Chen-Lieh to utilize a compressible liner as taught by Liu for creating a

Art Unit: 3743

"watertight engagement with the facial skin of the user in a region around the eyes and nose (Col. 2, lines 1-2)..." so that water does not enter the chamber formed between the goggles and the face of the user.



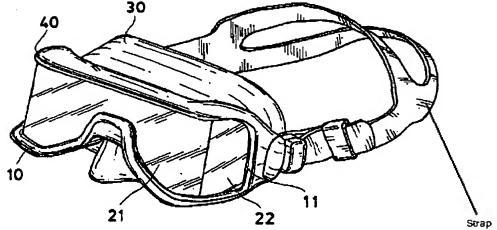


FIG. 2

4. With regards to claim 2, what is taught by Chen-Lieh is a goggle with all the limitations of claim 2 with the exception of wherein said lens includes a U-shaped liner

Art Unit: 3743

interface presenting an inner surface, wherein said liner is adhesively attached to the inner surface. What is taught by Chen-Lieh are goggles wherein the peripheral edge 24 of the lens 20 is fitted into the frame edge 31 (Col. 2, lines 40-44). After reviewing the specification, the examiner has concluded that the applicant never establishes any criticality for using a liner interface to engage the liner to the lens. Therefore it would have been an obvious matter of design choice to one of ordinary skill in the art at the time the invention was made to engage the lens with the liner using a liner interface, the groove means taught by Chen-Lieh, or any other means known in the art such as clips that would be effective in attaching the liner to the lens of the goggles.

Page 8

5. With regards to claim 3, what is taught and shown by Chen-Lieh in Figs. 1-5 is a goggle wherein said liner (30) includes an impervious outer layer to water (inherent that liner is impervious to water because it is used as a diving mask that is intended to keep water out of the chamber between the goggles and the face of the user. What is not disclosed is that the liner (30) is made of a compressible material. What is taught by Liu are goggles in which the liner (102) is compressible (Col. 1, line 66 to Col. 2, line 7; states that peripheral edge 102 is resilient which means it is capable of being compressed). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the goggles of Chen-Lieh to utilize a compressible liner as taught by Liu for creating a "watertight engagement with the facial skin of the user in a region around the eyes and nose (Col. 2, lines 1-2)..." so that water does not enter the chamber formed between the goggles and the face of the user.

Art Unit: 3743

6. With regards to claim 4, what is taught and shown by Chen-Lieh is a goggle with all the limitations of claim 4 with the exception of wherein the compressible material being chosen from the group consisting essentially of gels, flowable rubber, foams, and sponges. What is taught by Liu is the compressible material (peripheral edge 102) being made of a material such as rubber (Col. 1, line 66 to Col. 2, line 7). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to utilize rubber as the material chosen for the compressible material because it is well known in the art that rubber provides a flexible yet resilient material that can effectively create a watertight seal against the face of the user. Further since no criticality has been disclosed by the applicant as to which material is better, all the materials listed in claim 4 are considered equivalent.

Page 9

- 7. With regards to claim 5, what is taught and shown by Chen-Lieh in Fig. 2 shown above are securing elements including at least one adjustable strap removable coupled to the lens (as shown in Fig. 2, straps are removable if pulled through the stirrups).
- 8. With regards to claim 6, what is taught and shown by Chen-Lieh in Figs 1-5 is a goggle with all the limitations of claim 6 with the exception of wherein said at least one strap comprises stretchable material. What is taught and shown by Hunter in Fig. 2 is a goggle wherein said at least one strap (19) is comprised of a stretchable material (Col. 3, lines 44-46; states that headband is elastic). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the straps of the goggle taught by Chen-Lieh to be comprised of a stretchable material as taught by

Page 10

Application/Control Number: 10/675,288

Art Unit: 3743

Hunter so that the goggles may be worn by a wide range of users with different head sizes.

- 9. With regards to claim 7, what is taught and shown by Chen-Lieh in Fig. 2 is a goggle wherein the securing element includes an adjustable fastener operable to fix the strap in one of a plurality of positions. As shown in Fig. 2 above, the strap can either be pulled taut about the stirrup to decrease the diameter of the goggle head size, or loosened about the stirrup to increase the diameter of the diameter of the goggle head size.
- 10. With regards to claim 11, what is taught and shown by Chen-Lieh is a goggle wherein said front, left, and right sections are integrally formed (Fig. 1, 3, and 4), so as to present a unitary body.
- 11. Claim 8 is rejected under 35 U.S.C. 103(a) as being unpatentable over Chen-Lieh/Hunter/Liu in further view of US Patent No. 5421037 to Schulze.
- 12. With regards to claim 8, what is taught and shown by Chen-Lieh in Fig. 2 is a goggle wherein said securing element includes a strap and stirrup configuration. What is not taught by Chen-Lieh but is taught by Schulze in Figs. 1-3 is said fastener including a loop (18) and hook patch (VELCRO hook fastener strips 34 and 36), said loop patch being operable to receive and hold the hook patch (Col. 2, lines 49-68). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the goggle of Chen-Lieh to utilize a hook and loop type fastener to secure straps of the goggles against the head of the user because it is well known in the art and has proven effective as taught by Schulze to secure goggles to the

Art Unit: 3743

head of a user. Further after reviewing the specification the applicant never establishes any criticality for using a hook and loop type fastener and goes on to state that "however, other conventional means of adjustably fastening the strap ends, including buckles, snaps, pins, clips, and a combination thereof may be utilized," essentially admitting that all these listed fastening means are equivalent. Therefore it would have been an obvious matter of design choice to one of ordinary skill in the art at the time the invention was made to utilize any effective means including hook and loop type fasteners, clips, or any other means that are effective in securing goggles to the head of a user.

- 13. Claim 9 is rejected under 35 U.S.C. 103(a) as being unpatentable over Chen-Lieh/Hunter/Liu in further view of US Patent No. 6588899 to Pierotti.
- 14. With regards to claim 9, what is taught and shown by Chen-Lieh/Hunter/Liu is a goggle with all the limitations of claim 9 with the exception of wherein said lens presents a half teardrop shaped vertical cross-section. What is taught by Pierotti in Col. 1, lines 26-30 in his disclosure, it is stated that swim or riding goggles are well known to have tear-dropped shaped lenses to reduce aerodynamic drag. Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to utilize a teardrop shaped lens for the goggles taught by Chen-Lieh/Hunter/Liu as taught by Pierotti to reduce drag experienced by the user of the goggles as they swim underwater.
- 15. Claim 10 is rejected under 35 U.S.C. 103(a) as being unpatentable over Chen-Lieh/Hunter/Liu in further view of US Patent No. 4912777 to Gasbarro.

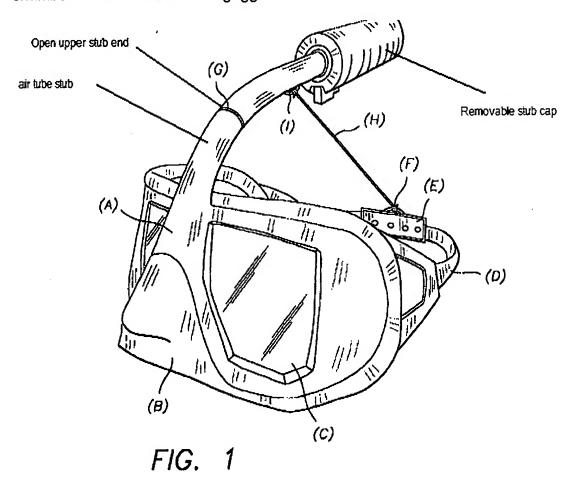
**Art Unit: 3743** 

16. With regards to claim 10, what is taught and shown by Chen-Lieh/Hunter/Liu is a goggle with all the limitations of claim 10 with the exception of said liner (30) being fluorescent. What is taught by Gasbarro is a diver's safety cap in which it is taught that the outer shell of the helmet may have fluorescent paint or tape applied to it so that others may be able to identify and visually locate the user of the helmet. Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to apply fluorescent coloring to the goggles taught by Chen-Lieh/Hunter/Liu because it is well known in the art to apply fluorescent tape or paint to the apparel of scuba divers so that they may be visually located by others underwater where it is known to be very dark.

- 17. Claim 13-14 rejected under 35 U.S.C. 103(a) as being unpatentable over US Patent No. 5524611 to Fu in view of Chen-Lieh in further view of Hunter in further view of Liu.
- 18. With regards to claim 13, what is taught and shown by Fu in Figs. 1 and 2 is a goggle with transparent lenses and a securing element (D, E, and F) for securing the lens in a fixed position relative to the wearer's face, and compressing the liner (B) so as to form an airtight chamber between the lens and the portion of the wearer's face, when the goggle is donned. What is further taught is that the goggles create a seal with a portion of the wearer's face including the eyes and nose (Fig. 1), said lens (C) defining an orifice (where tube including valve mechanism is attached at grooves (G); an air stub (labeled in figure 1 below) sealably attached to the lens and presenting a tubular body defining an open upper stub end, wherein said body is coaxially aligned with the orifice,

so as to fluidly intercommunicate the airtight chamber and upper stub end; and a stub cap (W; Fig. 6) removably fastened (via grooves G) to the upper stub end and operable to prevent the filtration of fluid into the upper stub end (Col. 3, lines 20-24). What is not taught by Fu is that the goggles has a flexible lens having transparent front, left and right sections, wherein said front section defines a lateral front length, and said left and right sections extend transversely from the front section and presents a length not less than one eight of the lateral front length. What is taught and shown by Chen-Lieh in Figs 1-5 and the figures above is a periphery viewable goggle for protecting a portion of a wearer's face from externalities, said goggle comprising: a lens (20) having transparent front, left and right sections (labeled in figure above), wherein said front section defines a lateral front length, and said left and right sections each extends transversely from the front section and presents a length not less than one-eighth of the lateral front length. Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the goggle of Fu to include a periphery viewable goggles because it is well known in the art that it is beneficial for a wearer to be able to see in his peripheral views in order to see objects that would normally be in the user's "blind spots" to prevent accidentally hitting the head of the user into unseen objects. What is further not taught by Fu, but taught by Hunter is that the lens (C) of the goggles are flexible. Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the lens of Fu to be flexible because it is well known in the art as taught by Hunter to make the lenses flexible to perhaps be able to make the lenses removable for cleaning or replacement. Further, Fu does not

explicitly state that the liner (B) is compressible. What is taught by Liu are goggles in which the liner (102) is compressible (Col. 1, line 66 to Col. 2, line 7; states that peripheral edge 102 is resilient which means it is capable of being compressed). Therefore it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify the goggles of Fu to utilize a compressible liner as taught by Liu for creating a "watertight engagement with the facial skin of the user in a region around the eyes and nose (Col. 2, lines 1-2)..." so that water does not enter the chamber formed between the goggles and the face of the user.



Art Unit: 3743

19. **With regards to claim 14**, what is taught and shown by Fu is goggle and a filter cap (W wit grid end X) removably fastenable (via grooves G) to the open upper stub end, and configured to separate air from particulate air-borne matter (inherent that grid or net-like end X would filter air from particulate air-borne matter depending on the size of the particulates as it enters the tube).

## Allowable Subject Matter

20. Claim 12 is objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

#### Conclusion

21. The prior art made of record and not relied upon is considered pertinent to the applicant's disclosure. US 5608920, US 2182104, and US 6921164.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Amadeus S. Lopez whose telephone number is (571) 272-7937. The examiner can normally be reached on Mon-Fri 8:00AM-4:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Henry Bennett can be reached on (571) 272-4791. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Amadeus S Lopez

Examiner Art Unit 3743

July 19, 2006

**ASL** 

Henry Bennett Supervisory Patent Examiner

2mun 2700